MATERIAL SAFETY DATA SHEET

PROSOCO, Inc.

I PRODUCT IDENTIFICATION

MANUFACTURER'S NAME AND ADDRESS:
PROSOCO, Inc.
3741 Greenway Circle
Lawrence, KS 66046

EMERGENCY TELEPHONE NUMBERS:
8:00 AM – 5:00 PM CST Monday-Friday: 785/865-4200
NON-BUSINESS HOURS (INFOTRAC): 800/535-5053

PRODUCT TRADE NAME: **Sure Klean® 101 Lime Solvent**

II HAZARDOUS INDREDIENTS

CHEMICAL NAME	(COMMON NAME)	CAS NO.	NFPA CODE	ACGIH TLV/TWA	OHSA PEL/TWA
Hydrogen Chloride Solution	(Hydrochloric Acid)	7647-01-0	3,0,0,-	5 ppm (Ceiling)	5 ppm (Ceiling)

Percent content of hazardous ingredients withheld as trade secret pursuant to Massachusetts regulations.

III TYPICAL PHYSICAL DATA

	BOILING POINT (°F)	VAPOR PRESSURE (mm Hg)	VAPOR DENSITY (1=Air)	EVAPORATION RATE (1=Butyl Acetate)
Hydrogen Chloride Solution	150°F	78 (68°F)	1.27	< 1.00

	SPECIFIC GRAVITY	SOLUBILITY IN WATER	APPEARANCE AND ODOR
Sure Klean® 101 Lime Solvent	1.12	100%	Clear liquid with brown color, pungent odor

IV FIRE AND EXPLOSION HAZARD DATA

EMERGENCY OVERVIEW

Sure Klean® 101 Lime Solvent is a brown-colored liquid with an irritating pungent odor. The vapor and mist from this product may cause irritation of the respiratory tract, wear appropriate respiratory protection. Wear splash-proof chemical goggles when handling this product.

FLASH POINT (METHOD): None

FLAMMABLE LIMITS: Unknown

EXTINGUISHING MEDIA: Any media appropriate for surrounding the type of fire involving this product.

SPECIAL FIRE FIGHTING PROCEDURES: Wear NIOSH/MSHA approved self-contained breathing apparatus with a full face piece operated in pressure demand or other positive pressure mode and full body protective clothing when fighting fires. Water may be used to cool closed containers.

UNUSUAL FIRE AND EXPLOSION HAZARDS: Reacts with most metals to release hydrogen gas which can form explosive mixtures with air. Extinguish all nearby sources of ignition.

V HEALTH HAZARD DATA

PRIMARY ROUTES OF EXPOSURE: Inhalation, skin, eyes.

CARCINOGEN INFORMATION: Not listed (OSHA, IARC, NTP). No standard carcinogenicity studies for hydrogen chloride were identified. Two studies on rats were conducted to determine if hydrogen chloride increased the formation of nasal tumors or increased the carcinogenic potential of formaldehyde. In both studies the rats were exposed to 10-ppm hydrogen chloride, 6 hours per day, 5 days per week. One study lasted 84 weeks while the other lasted the animals' lifetime. Hydrogen chloride did not cause an increase in nasal tumors and did not increase the carcinogenicity of formaldehyde.

MEDICAL CONDITIONS AGGRAVATED BY OVEREXPOSURE: Asthma, bronchitis, emphysema, and other lung conditions; and chronic nose, sinus, or throat conditions. Exposures of 100 ppm for six hours a day for 50 days caused only slight unrest and irritation to the eyes and nose of rabbits, guinea pigs and pigeons. The hemoglobin content of the blood was also slightly diminished. Monkeys receiving 20 exposures of 33 ppm for six hours did not display any adverse effects. Higher exposures (unspecified) have caused weight loss which paralleled the severity of exposure. Baboons exposed to 500, 5000 or 10,000 ppm for 15 minutes did not have significant alterations in any pulmonary function parameters 3 days or 3 months after exposure. In humans long term overexposure has been associated with erosion of the teeth.

EFFECTS OF OVER EXPOSURE: Causes severe damage to eyes and even blindness very rapidly. Causes burns, possible deep ulceration to skin. Breathing of mist or dust can cause damage to nasal and respiratory passages. Swallowing results in severe damage to mucous membranes and deep tissue; can result in death on penetration to vital areas.

EYE CONTACT: Liquid or concentrated vapors can cause eye irritation, severe burns and permanent damage including blindness even after a short exposure to small amounts.

SKIN CONTACT: Liquid or concentrated vapors can rapidly cause burning of skin. Repeated or prolonged contact with dilute solutions and concentrated vapors can cause irritation and dermatitis.

INHALATION: Hydrogen chloride gas, mist, and vapor can cause irritation of respiratory tract, with burning, choking, coughing, headaches, and rapid heartbeat. 35 ppm can cause irritation of the throat and 50-100 ppm is nearly unbearable for one hour. Inflammation, destruction of nasal passages and breathing difficulties can occur with high concentrations and may be delayed in onset. Inhalation of sufficiently high concentrations may result in laryngeal spasms, laryngeal edema or rapidly developing pulmonary edema. Mists may also cause bleeding of the nose and gums, and ulceration of the nasal or oral mucosa. 1,000-2,000 ppm can be fatal.

INGESTION: Unlikely route of exposure. Can cause severe burns of mouth, esophagus, and stomach. Nausea, pain, and vomiting may occur. Depending on the amount swallowed, holes may develop in the intestinal tract, kidney inflammation, shock and death can occur.

EMERGENCY AND FIRST AID PROCEDURES:

EYE CONTACT: Rinse eyes with large quantities of water for at least 15 minutes, holding eyelids apart to ensure flushing of the entire eye surface. Get medical attention immediately.

SKIN CONTACT: Remove contaminated clothing and flush exposed area with large quantities of water for at least 15 minutes. Launder contaminated clothing before reuse. Discard contaminated shoes. Get immediate medical attention.

INHALATION: Remove person to fresh air. If breathing stops, administer artificial respiration, preferably mouth-to-mouth. If breathing is difficult, give oxygen. Get medical attention immediately.

INGESTION: If conscious, give large quantities of water or milk. Do not induce vomiting. Get medical attention immediately. Do not give anything by mouth to an unconscious or convulsing person.

VI REACTIVITY DATA

STABILITY: Stable

CONDITIONS TO AVOID: Contact with strong bases (alkali), can cause violent reaction generating large amounts of heat.

INCOMPATIBILITY (MATERIALS TO AVOID): Metals, oxidizing agents, nitric acid, chlorates, sulfides, and cyanides. Contact with sulfides releases poisonous flammable hydrogen sulfide. Mercuric sulfate, perchloric acid, carbides of calcium, cesium, rubidium, acetylides of cesium and rubidium, phosphides of calcium and uranium, and lithium silicide.

Hydrogen Chloride can react with cyanide, forming lethal concentrations of hydrocyanic acid. Do not enter confined spaces such as tanks or pits without proper entry procedures as required by 29 CFR 1910.146.

HAZARDOUS COMBUSTION OR DECOMPOSITION PRODUCTS: Hydrogen gas when contacting metals, hydrogen chloride, carbon monoxide and carbon dioxide. Hydrogen gas generation has the highest potential for harm in confined or poorly ventilated areas where concentrations can approach flammable or explosive concentrations.

VII SPILL OR LEAK PROCEDURES

SPILL, LEAK, WASTE DISPOSAL PROCEDURES: Evacuate immediate area where concentrated fumes are present. Cleanup personnel must wear proper protective equipment. Provide adequate ventilation. Completely contain spilled material with dikes, etc., and prevent runoff into ground and surface waters or into sewers.

Dilution with water will decrease the fumes generated from spilled product. Spills and leaks should be neutralized by pouring dry soda ash or lime over the affected area. Concentrated product should be diluted with water before adding neutralizing agents to keep splattering and fumes to a minimum. Approximately 2.5 pounds of lime are required to neutralize one gallon of this product. Allow powdered material to remain on spill for five to ten minutes and flush thoroughly with water. Neutralized material, both liquid and solid, should be recovered for proper disposal.

WASTE DISPOSAL METHODS: Recovered solids or liquids may be disposed of in a permitted waste management facility. Neutralized materials may be discharged to a sanitary sewer with approval of the receiving treatment plant. Typical pH range of 6-10 is generally considered appropriate for discharge. Consult federal, state, and/or local authorities for approved procedure. For additional information regarding handling and disposal of rinse-water, please review Technical Bulletin 200-CW "Controlled Handling of Cleaning Wastewater". Empty containers must be triple rinsed before disposal in a permitted sanitary landfill. Check local restrictions.

VIII SPECIAL PROTECTION INFORMATION

RESPIRATORY PROTECTION: For vapor or mist concentrations which exceed or are likely to exceed 5 ppm Threshold Limit Value (TLV), wear a NIOSH/MSHA approved half-mask respirator with acid gas cartridges. NIOSH/MSHA approved self-contained breathing apparatus (SCBA) or pressure demand supplied air respirator with full face piece should be worn when concentrations exceed 50 ppm. A SCBA is recommended by NIOSH during leaks and/or emergencies. Follow all applicable respirator use standards and regulations.

VENTILATION: Provide sufficient general and/or local exhaust ventilation to maintain exposure below the TLV.

PROTECTIVE CLOTHING: Wear splash resistant neoprene or PVC rain suit.

PROTECTIVE GLOVES: Nitrile rubber type, neoprene or PVC with acceptable acid resistance.

EYE PROTECTION: Chemical splash goggles and/or full face shield (8 inch minimum) in compliance with OSHA regulations. Do not wear contact lenses because they may contribute to the severity of an eye injury.

OTHER PROTECTIVE EQUIPMENT: Acid-resistant rubber boots, headgear. Eyewash and safety shower.

IX SPECIAL PRECAUTIONS

WORK PRACTICES: Proper work practices and planning should be utilized to avoid contact with workers, passersby, and non-masonry surfaces. Brush on or apply at the lowest practical pressure. Do not atomize during application. Application equipment, scaffolding, swing stages and support systems must be constructed of acid resistant materials. Use only well maintained staging and scaffolding that is equipped with steel cable. This product will attack nylon, cotton and hemp roping. Use polypropylene ropes and safety lines. Dilution and application equipment should be of polypropylene or HDPE construction. Beware of wind drift. Wind-drift hazards may be diminished by pre-rinsing with low pressure water before pressure washing. Divert pedestrian traffic around work areas. See the Product Data sheet and label for specific precautions to be taken during use. Smoking, eating and drinking should be discouraged during the use of this product. Wash hands after handling or use.

This product is only to be used as supplied and specified. Do not alter, mix with chlorine-type bleaches or other chemicals, or dilute product except as specified on the label and Product Data sheet.

PRECAUTIONS TO BE TAKEN IN HANDLING AND STORAGE: Use proper safety equipment (see section VIII) when handling. Store in a cool, well-ventilated area. Separate from oxidizing agents, nitric acid, alkalis, chlorates, sulfides, etc. (see section VI). Do not remove product label. Material diluted for application must be properly labeled and stored in acid-resistant containers with rubber-lined steel, polypropylene or polyethylene construction..

Addition of acidic cleaner to water releases heat, which can result in violent boiling and spattering. **Always add cleaner to water slowly and in small amounts. Never use hot water. Never add water to acidic cleaners.**

Containers of this material may be hazardous when emptied, since emptied containers retain product residues (vapor, liquid, and/or solid). All hazard precautions given in this data sheet must be observed.

OTHER PRECAUTIONS: Do not get in eyes, on skin or on clothing. Can cause severe injury or blindness. Avoid breathing mist or vapor. Provide ventilation sufficient to limit employee exposure below OSHA permissible limit. Do not take internally. Wash thoroughly after handling.

X REGULATORY INFORMATION

SHIPPING: This product carries the shipping description **"UN3264, Corrosive liquid, acidic, inorganic, n.o.s. (Hydrochloric acid), 8, II"** for shipping by ground, air and ocean transport. The product meets applicable DOT and UN standards when shipped in the original, unopened factory packaging, although container size may be limited for air transport. Some parcel shipping companies may limit container sizes.

NATIONAL MOTOR FREIGHT CLASSIFICATION: 44157 Sub 3 Rate Class: 85

SARA 313 REPORTABLE:

CHEMICAL NAME	CAS	UPPERBOUND CONCENTRATION % BY WEIGHT
Hydrogen Chloride	7647-01-0	30 %

CALIFORNIA PROPOSITION 65: **This product contains no chemicals listed under California's Proposition 65.**

XI OTHER

MSDS Status:

Date of Revision: February 23, 2007

For Product Manufactured After: February, 2005

Changes: Updated Shipping Description order of information due to regulatory changes

Item #: 10010

Approved By: Product Stewardship Committee

DISCLAIMER:

The information contained on the Material Safety Data Sheet has been compiled from data considered accurate. This data is believed to be reliable, but it must be pointed out that values for certain properties are known to vary from source to source. PROSOCO, Inc. expressly disclaims any warranty express or implied as well as any liability for any injury or loss arising from the use of this information or the materials described. This data is not to be construed as absolutely complete since additional data may be desirable when particular conditions or circumstances exist. It is the responsibility of the user to determine the best precautions necessary for the safe handling and use of this product for his unique application. This data relates only to the specific material designated and is not to be used in combination with any other material. Many federal and state regulations pertain directly or indirectly to the product's end use and disposal of containers and unused material. It is the purchaser's responsibility to familiarize himself with all applicable regulations.

DATE OF PREPARATION: February 23, 2007